

# FORM 1494

## REMOTE ACCUSET 2 RETROFIT INSTRUCTIONS

Part No. 069656 (LT40HD-R, LT50HD-R & Super LT30HD/40HD-R)

Part No. 069657 (LT70HD-R DC)

The enclosed parts can be retrofitted to DC remote sawmills equipped with Accuset. The new Accuset 2 system will provide improved reliability and functionality.

### Installation Instructions

1. Use the sawmill controls to move the saw carriage so the hydraulic power strip (if applicable) is not engaged and the saw head is positioned so the blade height scale indicates 12".
2. Turn the key switch to the OFF (#0) position and remove the key.
3. Remove the battery box cover and disconnect the negative battery terminal.

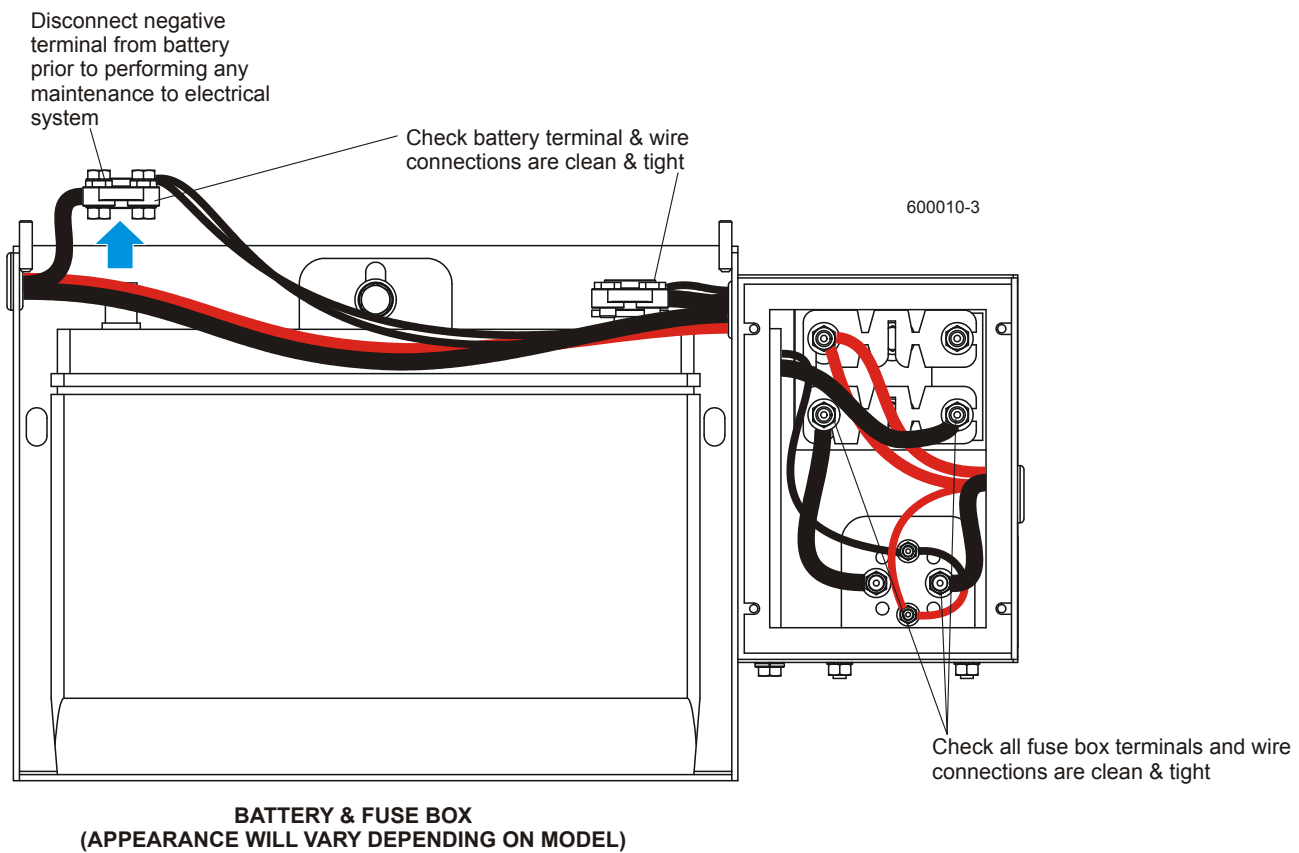


**WARNING!** Disconnect the negative battery terminal cable before performing any service to the 12-volt electrical system. Failure to do so may cause injury or electrical system damage.



**CAUTION!** Loose battery and/or fuse terminal connections may cause damage to Accuset 2 electrical components. Prior to installation, check all connections are clean and tight.

**See Figure 1.** Before removing any panel from the control box, disconnect the cable from the negative battery terminal.



**FIGURE 1**

4. Remove the fuse box cover. Inspect all connections inside the battery and fuse boxes. Be sure all surfaces are clean and connections are tight.

**NOTE:** Any loose fuse connections may cause the mounting hardware to burnish (discolor). If this condition exists, an adequate electrical connection will be difficult to achieve and the fuse block assembly should be replaced.

5. Replace the fuse box cover.

See Figure 2.

6. At the operator control box, use a Phillips screw driver to remove the rear control box panel.
7. Disconnect the transducer cable from the back of the Accuset control box.
8. Use a 5/16" socket wrench to loosen the four Accuset control box hold-down bar bolts. Use a Phillips screwdriver to remove the four screws at the front of the Accuset control box.
9. Lift the Accuset control box from the sawmill control and disconnect the two harnesses from the Accuset control panel.
10. Use a 5/32" hex wrench to loosen the two screws securing the cover to the Accuset control box. Use a 3/16" hex wrench to loosen the two cover stop screws. Remove all cover and stop screw hardware and install to the new Accuset 2 control box.

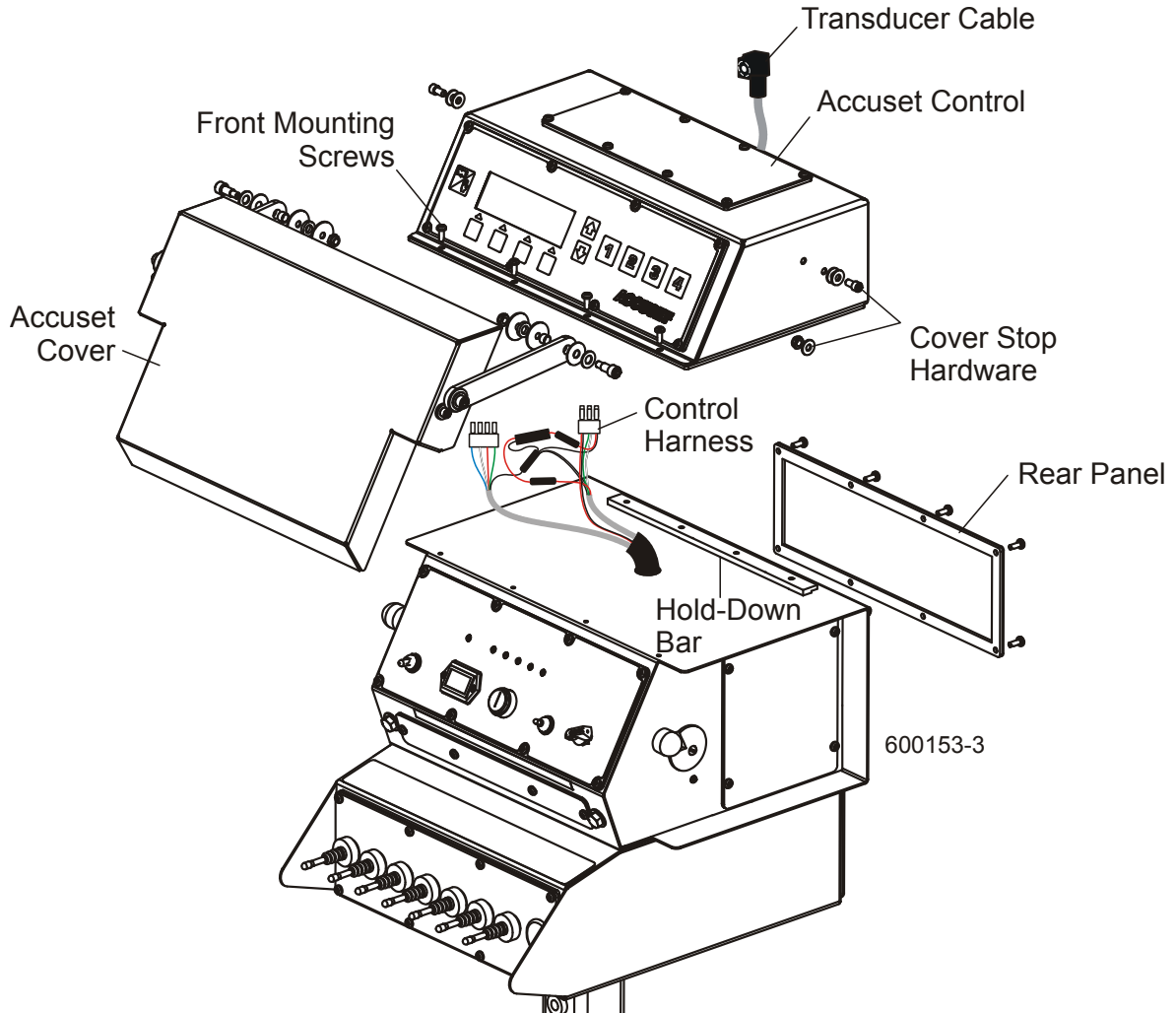
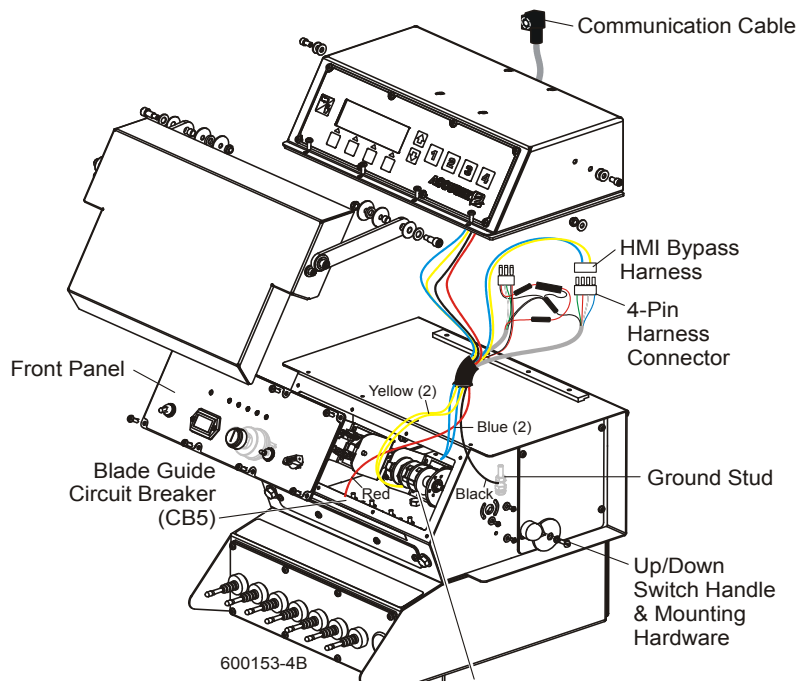


FIGURE 2

**See Figure 3.**

11. Connect the supplied HMI bypass harness to the existing four-pin harness connector (the six-pin connector will remain unconnected). Cut the tie wraps from the conduit entering the sawmill control and route the two bypass harness wires through the conduit and into the sawmill control box.
12. Position the Accuset 2 control box on top of the sawmill control and route the black, red, blue and yellow Accuset harness wires through the conduit into the sawmill control box (the gray wires will remain unconnected, lying in the Accuset control box). Be sure all wires are contained inside the conduit. If the existing conduit is too small, replace it with the supplied 6" piece of conduit.
13. Remove the sawmill front panel. Connect the red Accuset harness wire to the front terminal of the Blade Guide circuit breaker (CB5). DO NOT OVERTIGHTEN.
14. Use two of the supplied wire ties to secure the conduit around all wires.
15. Secure the Accuset 2 control box to the top of the sawmill control, positioning the rear lip under the hold-down bar. Tighten the four hold-down bolts and secure the front of the control box with the four screws previously removed.
16. Connect the black Accuset harness wire to the ground stud at the rear of the control box and secure with the 1/4-20 self-locking hex nut supplied.
17. Remove the up/down drum switch handle and remove the drum switch mounting bolts. Connect the yellow bypass harness and yellow Accuset harness wires to terminal #4 of the drum switch (leave any existing wires connected). Connect the blue bypass harness and blue Accuset harness wires to terminal #1 (leave any existing wires connected).

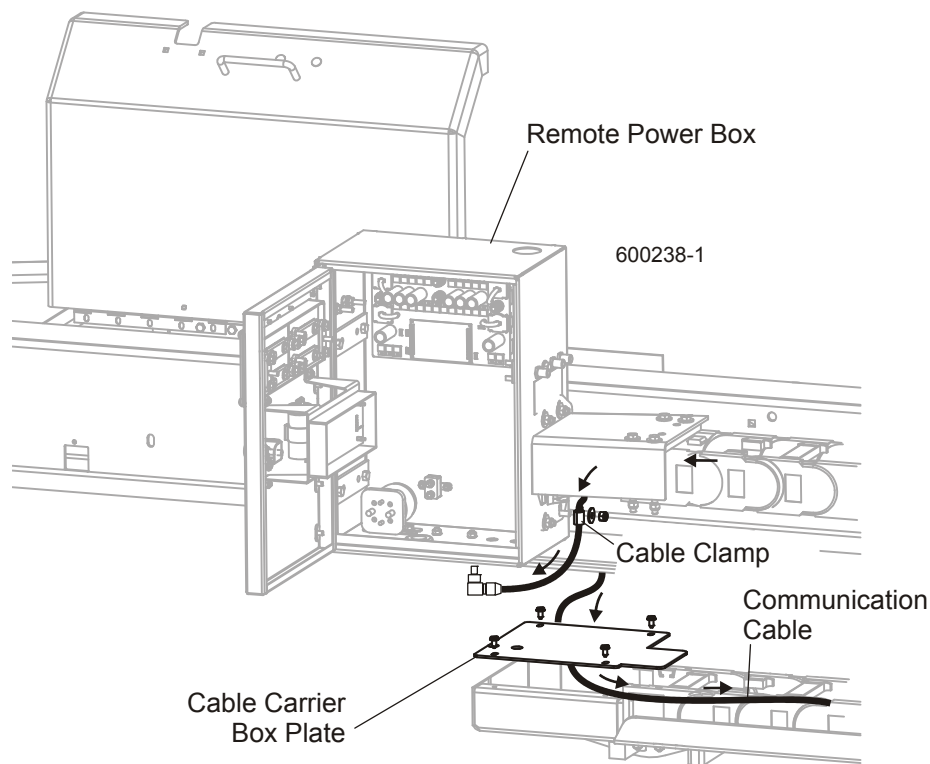


**FIGURE 3**

18. Reinstall the up/down drum switch to the side of the control box and reinstall the handle. Replace the front and rear control box panels.
19. Connect the supplied communication cable to the connector on the back of the Accuset 2 control.
20. Route the communication cable to the cable carrier.

**See Figure 4. LT70HD-R:**

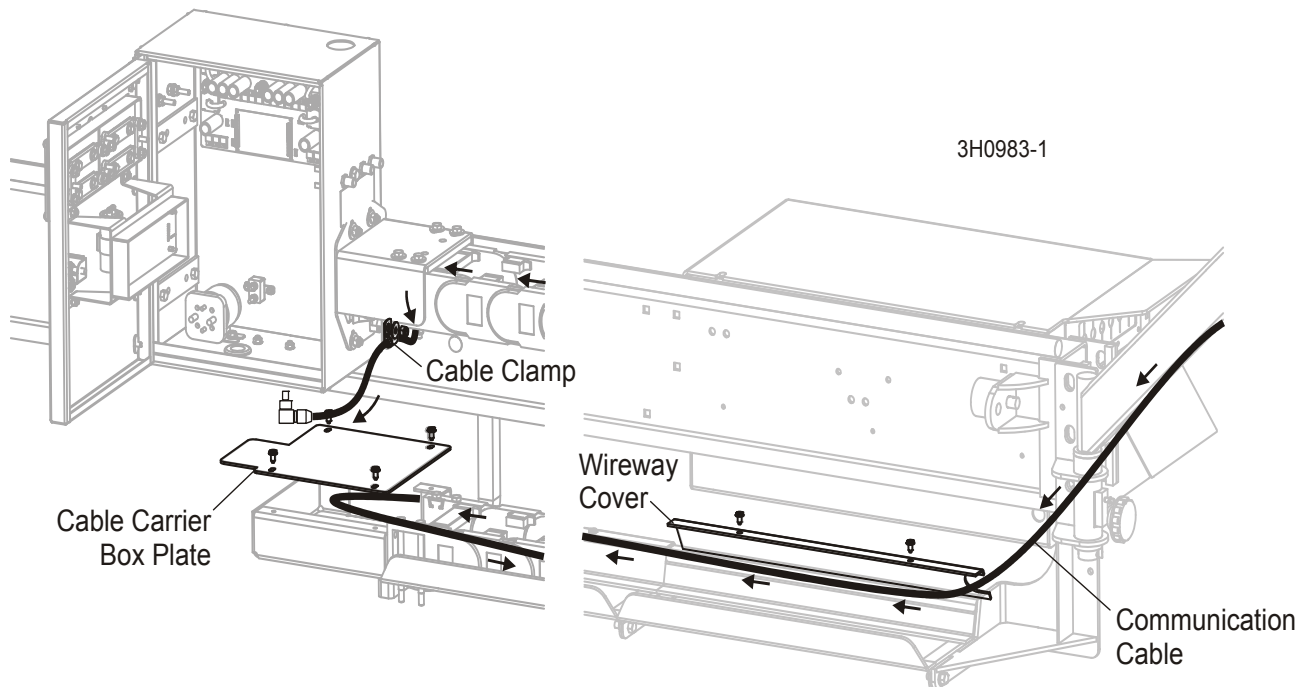
21. Follow the path of the existing transducer cable to route the new communication cable through the cable sleeve and into the cable storage box, removing the old cable as you go. Remove the cable carrier box plate and continue routing the cable through the box into the cable carrier. Remove wire ties securing the old cable. The new cable will connect at the bottom of the remote power box. Store any excess cable in the cable carrier box and replace the lid. Secure the communication cable to the other cables in the cable carrier with the provided wire ties. Use the provided cable clamp to secure the cable to the cable carrier mounting stud as shown.



**FIGURE 4**

**See Figure 5. Standard LT40HD-R & Super LT30HD/LT40HD-R:**

22. Follow the path of the existing transducer cable to route the new communication cable down the control pedestal into the cable carrier wireway, removing the old cable and tie wraps as you go. Remove the cable carrier box plate and continue routing the cable through the box into the cable carrier. Remove wire ties securing the old cable. The new cable will connect at the bottom of the remote power box. Store any excess cable in the cable carrier box and replace the lid. Secure the communication cable to the control pedestal and the other cables in the cable carrier with the provided wire ties. Use the provided cable clamp to secure the cable to the cable carrier mounting stud as shown.



**FIGURE 5**

23. Open the remote power box door and disconnect the three harnesses from the Accuset distribution panel mounted on the remote box door. Remove the old Accuset distribution panel from the remote power box door.

See Figure 6. LT70HD-R & Super LT30HD/LT40HD-R with softstart power feed after 9/04:

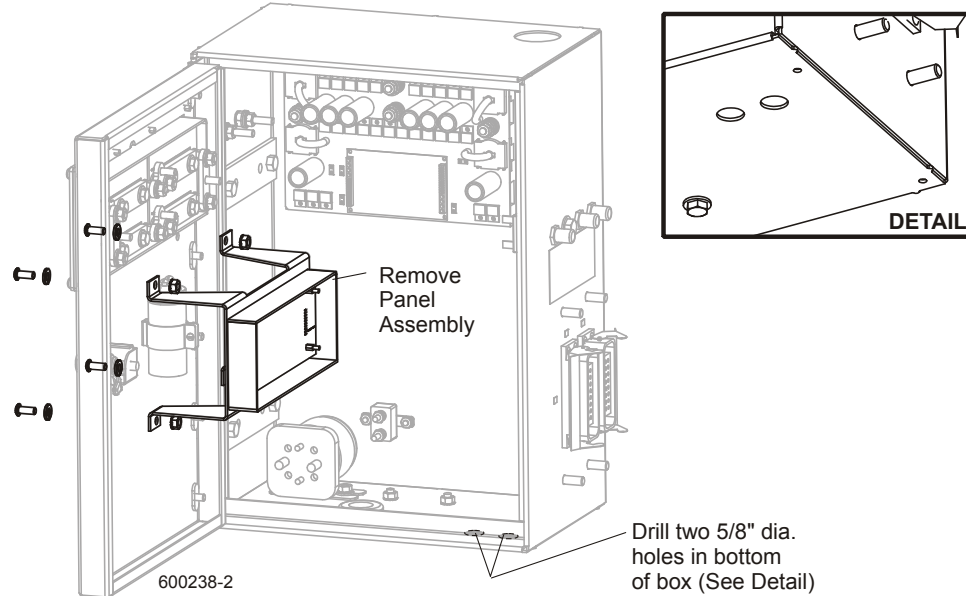


FIGURE 6

See Figure 7. Standard LT40HD-R (All) & LT70HD-R, Super LT30HD/LT40HD-R before softstart power feed before 9/04. **NOTE:** Replace the panel mounting hardware to plug the holes in the door after removing the panel.

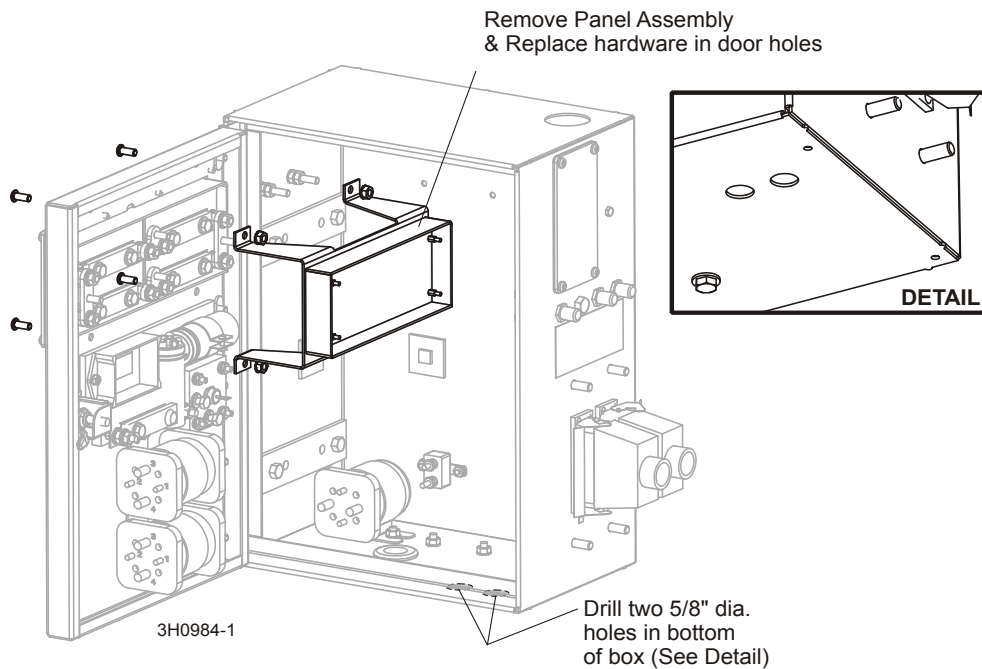


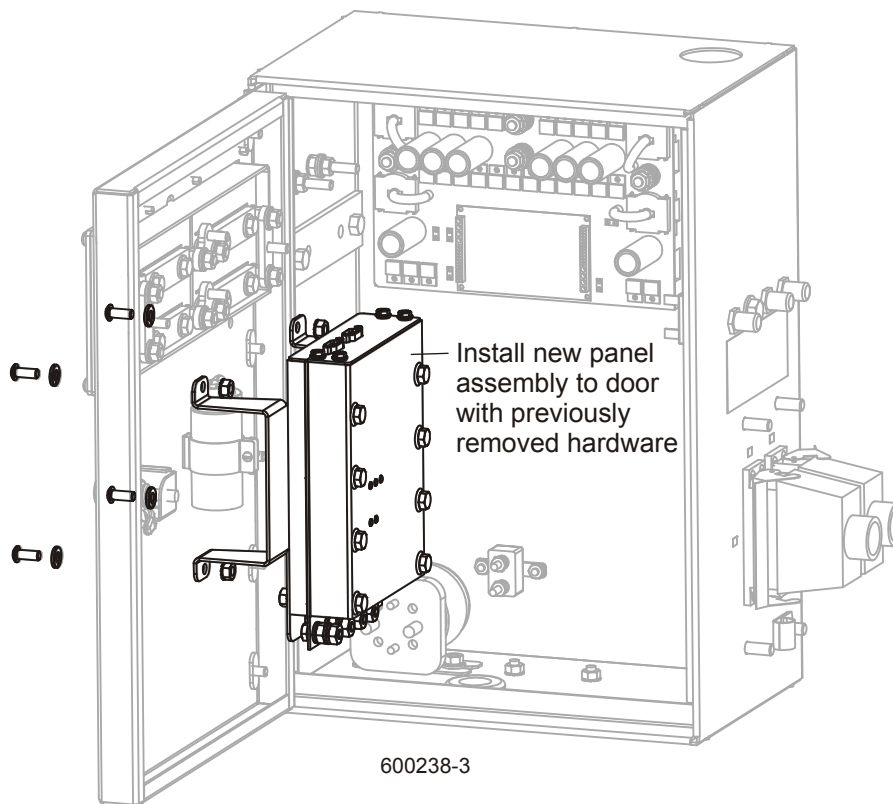
FIGURE 7

24. Use the supplied pilot drill bit and hole saw to drill two 5/8" holes in the bottom of the power box. The exact location of the holes is not critical. Suggested dimensions are 3" from the right side of the box, 5" from the rear of the box and 2" apart.

25. Install the new drive panel assembly to the remote power box.

**See Figure 8.** LT70HD-R & Super LT30HD/LT40HD-R with softstart power feed after 9/04:

Install the new panel assembly to the holes where the old panel was mounted to the door. Use the previously removed hardware to secure the panel to the door.

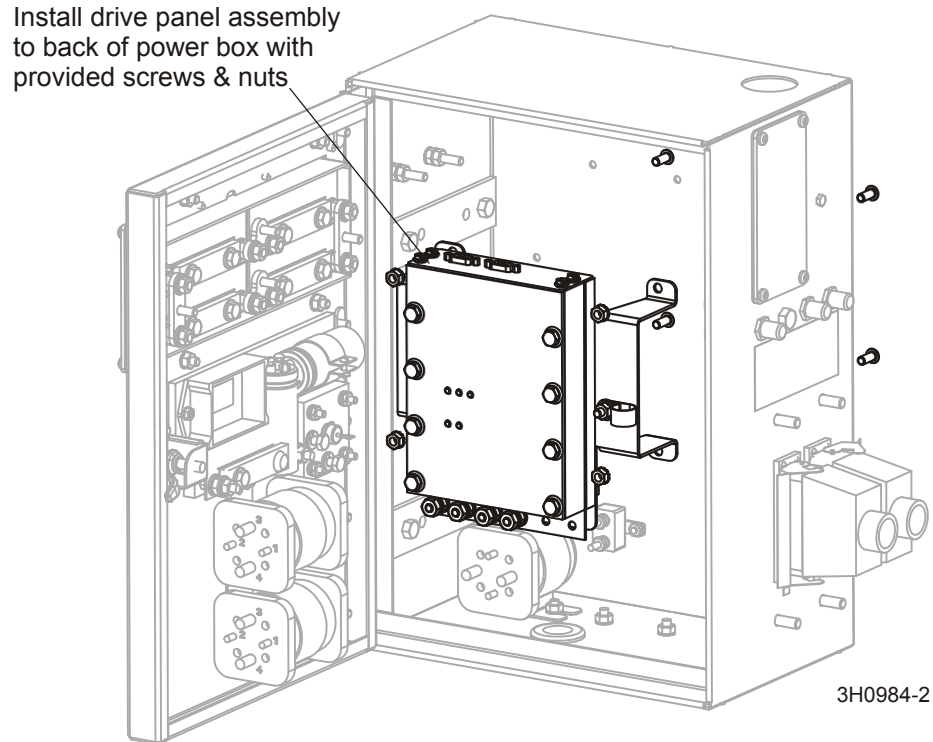


**FIGURE 8**



**See Figure 9.** Standard LT40HD-R (All) & LT70HD-R, Super LT30HD/LT40HD-R before soft-start power feed before 9/04.

Install the new panel to the back of the power box. Orient the panel vertically, with the cable clamp to the right. Center the assembly against the back panel where it won't interfere with other components. Mark the four hole locations using the new panel bracket as a template. Drill four 1/4" diameter holes through the back of the box. Use the supplied 1/4" button head screws and self-locking nuts to mount the assembly to the box.



**FIGURE 9**

See Figure 10.

26. Connect the bridge comm harness to the top left port of the drive control. Route the two cables to the new holes in the bottom of the power box. Remove the hex retaining rings from the cable connectors. Mount the 8-pin connector to the left hole and the 5-pin connector to the right hole. Secure the connectors to the box with the hex retaining rings.
27. If applicable, remove the Accuset RF filter circuit board from gray cable #40 that was connected to the old distribution panel. Connect the bridge bypass cable to the top right port of the drive control. Connect the other end to the connector on cable #40.
28. Disconnect the four wires currently connected to the old Accuset mosfet panel P1 - P4 terminals and route through the cable clamp on the drive control. Connect the wires to the terminals at the bottom of the drive control.
29. Connect the previously installed communication cable to the 5-pin connector in the bottom of the box. Connect the supplied transducer cable to the 8-pin connector and route to the transducer sensor.

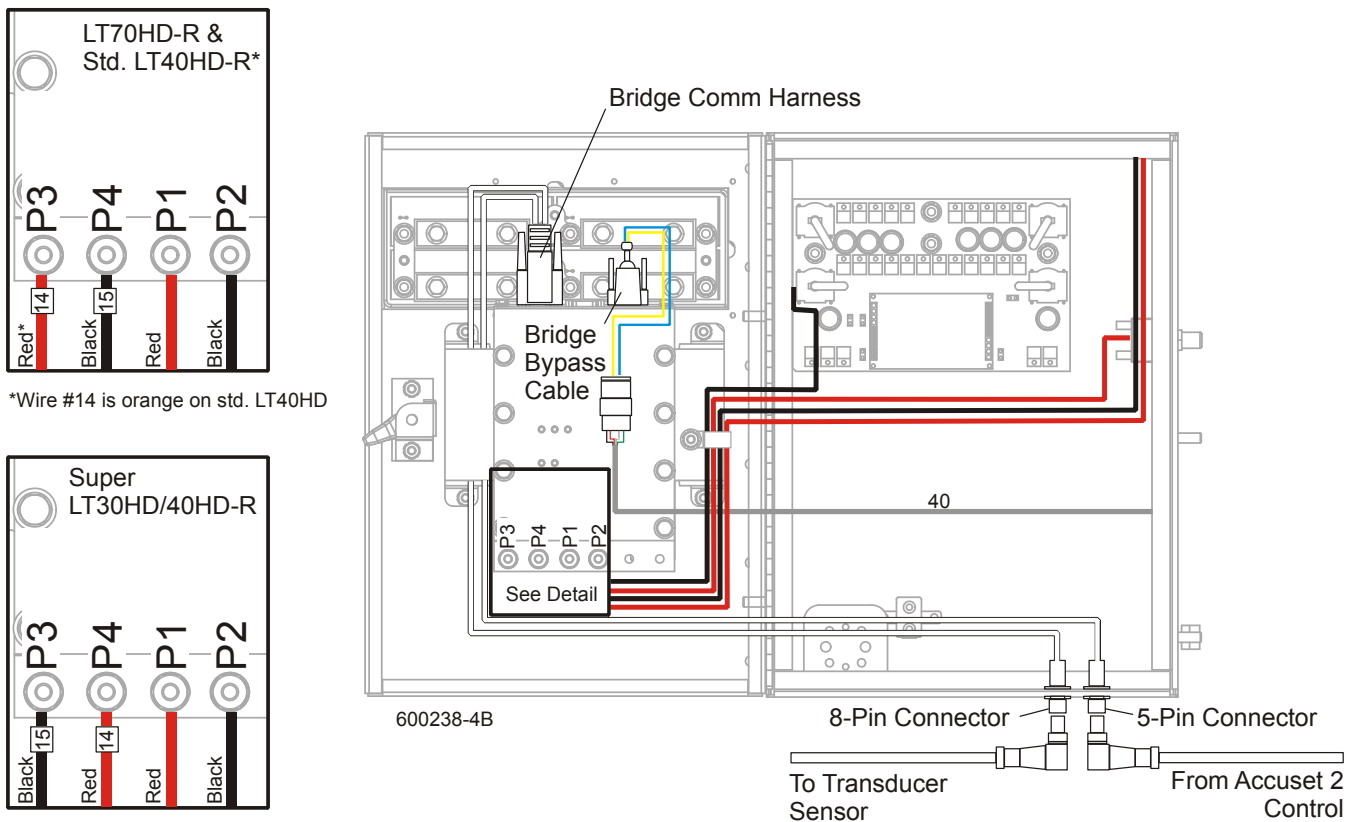


FIGURE 10

30. Secure cables & wires inside the power box with wire ties as necessary to limit movement and interference.

31. Remove the lower transducer sensor guard, disconnect the old transducer cable from the transducer sensor and remove the cable from the sawmill. Connect the new transducer cable to the sensor and secure to the power box mounting stud with the provided cable clamp as shown. Replace the lower sensor guard.

See Figure 11.

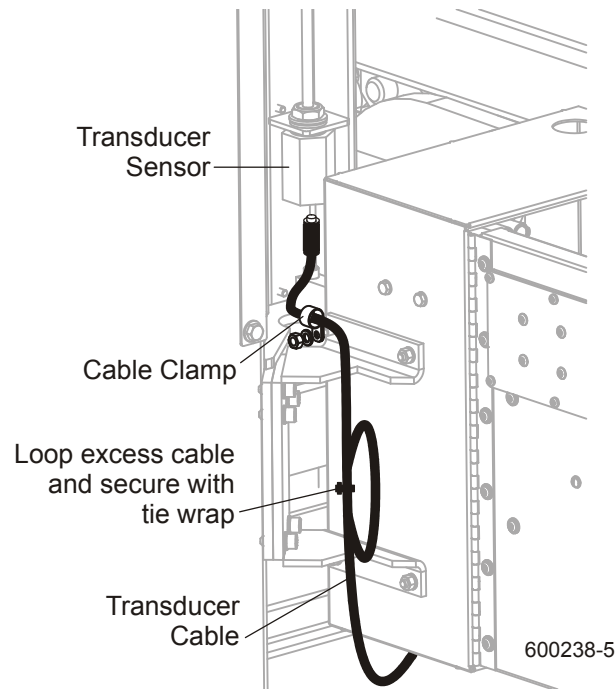
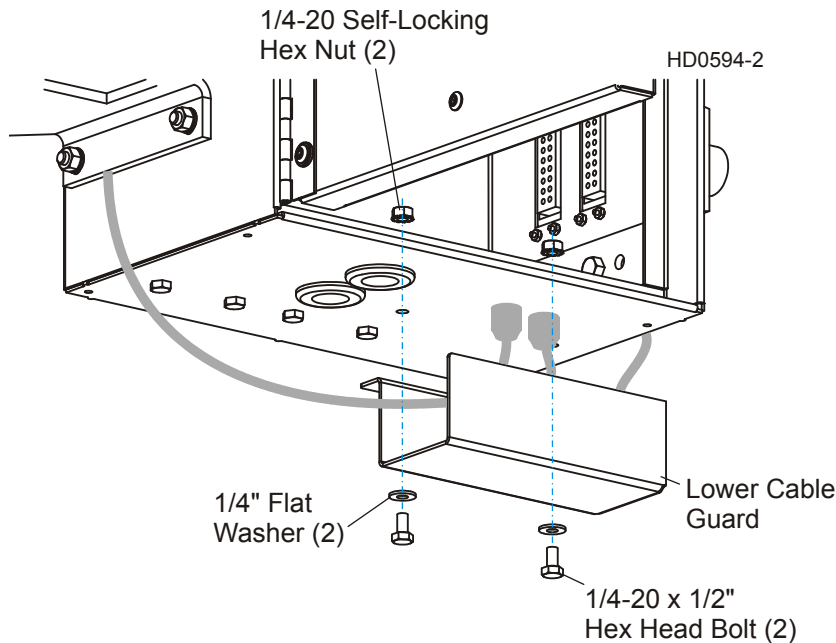


FIGURE 11

32. Place the supplied lower cable guard in position on the bottom of the remote power box with the mounting flange toward the back of the power box. Mark the two mounting hole locations on the power box and drill two 5/16" holes in the bottom of the box.
33. Use the supplied 1/4" hex head bolts, flat washers and self-locking nuts to secure the guard to the power box.

**See Figure 12.**



**FIGURE 12**

34. Recheck that all connections are tight & secure.
35. Reconnect the negative battery terminal cable and replace the battery box lid.
36. See the Setup section of the provided manual to calibrate your new Accuset 2 control.